

a positively-charged amino acid residue in the hairpin loop structure of wild-type human HGF has been replaced with an amino acid residue with a negative charge.

65. (New) A variant human hepatocyte growth factor (HGF) according to Claim 64 wherein at least amino acid residue R73 of SEQ ID NO:2 has been replaced by an amino acid residue with a negative charge.

66. (New) A variant human hepatocyte growth factor (HGF) according to Claim 64 wherein at least amino acid residue R76 of SEQ ID NO. 2 has been replaced by an amino acid residue with a negative charge.

67. (New) A variant human hepatocyte growth factor (HGF) according to Claim 64 wherein both amino acid residues R73 and R76 of SEQ ID NO:2 have been replaced independently with an amino acid residue with a negative charge.

68. (New) A variant human hepatocyte growth factor (HGF) according to Claim 64 comprising amino acid residue replacements R73E and R76E, numbered in accordance with SEQ ID NO:2.

69. (New) A variant human hepatocyte growth factor (HGF) according to Claim 64 comprising amino acid residue replacements R73E, R76E and R93E, numbered in accordance with SEQ ID NO:2.

70. (New) A variant human hepatocyte growth factor (HGF) according to Claim 64 comprising amino acid residue replacements R73E, R76E and R78E, numbered in accordance with SEQ ID NO:2.

71. (New) A variant human hepatocyte growth factor (HGF) according to Claim 64 consisting of human HGF with amino acid replacements R73E and R76E, numbered in accordance with SEQ ID NO:2.

72. (New) A variant human hepatocyte growth factor (HGF) according to Claim 64 consisting of human HGF with amino acid replacements R73E, R76E and R93E, numbered in accordance with SEQ ID NO:2.

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73. (New) A variant human hepatocyte growth factor (HGF) according to Claim 64 consisting of human HGF with amino acid replacements R73E, R76E and K78E, numbered in accordance with SEQ ID NO:2.

74. (New) A variant human hepatocyte growth factor (HGF) which is incapable of binding heparan sulphate proteoglycan but which binds to the HGF receptor wherein a positively-charged amino acid residue in the hairpin loop structure of wild-type HGF has been replaced with an amino acid residue with a negative charge, provided that the variant HGF is not a variant of human HGF in which the replacements (a) R73E, R76E

and R93E or (b) R73E and R76E or (c) K91E, R93E and K94E, numbered in accordance with SEQ ID NO:2, have been made.

75. (New) A variant human hepatocyte growth factor (HGF) according to Claim 74 wherein at least amino acid residue R73 of SEQ ID NO:2 has been replaced by an amino acid residue with a negative charge.

76. (New) A variant human hepatocyte growth factor (HGF) according to Claim 74 wherein at least amino acid residue R76 of SEQ ID NO:2 has been replaced by an amino acid residue with a negative charge.

77. (New) A variant human hepatocyte growth factor (HGF) according to Claim 74 wherein both amino acid residues R73 and R76 of SEQ ID NO:2 have been replaced independently with an amino acid residue with a negative charge.

78. (New) A variant human hepatocyte growth factor (HGF) comprising amino acid residue replacements R73E and R76E; or amino acid residue replacements R73E, R76E and R93E; or amino acid residue replacements R73E, R76E and R78E, numbered in accordance with SEQ ID NO:2.

79. (New) A variant human hepatocyte growth factor (HGF) consisting of human HGF with amino acid residue replacements R73E and R76E, or R73E, R76E and R93E, numbered in accordance with SEQ ID NO:2.

80. (New) A method of inducing DNA synthesis in a cell comprising providing to the cell a variant human hepatocyte growth factor (HGF) which is incapable of binding a heparan sulphate proteoglycan but which binds to the HGF receptor wherein a positively-charged amino acid residue in the hairpin loop structure of wild-type HGF has been replaced with an amino acid residue with a negative charge.

81. (New) A method of inducing dissociation and scattering of cells in a cell population, the method comprising providing to the cell population a variant human hepatocyte growth factor (HGF) which is incapable of binding a heparan sulphate proteoglycan but which binds to the HGF receptor wherein a positively-charged amino acid residue in the hairpin loop structure of wild-type human HGF has been replaced with an amino acid residue with a negative charge.

82. (New) A method according to Claim 80 or 81 wherein at least amino acid residue R73 of SEQ ID NO:2 has been replaced by an amino acid residue with a negative charge in the variant human hepatocyte growth factor (HGF).

83. (New) A method according to Claim 80 or 81 wherein at least amino acid residue R76 of SEQ ID NO. 2 has been replaced by an amino acid residue with a negative charge in the variant human hepatocyte growth factor (HGF).

84. (New) A method according to Claim 80 or 81 wherein both amino acid residues R73 and R76 of SEQ ID NO:2 have been replaced independently by an amino acid residue with a negative charge in the variant human hepatocyte growth factor (HGF).

85. (New) A method according to Claim 80 or 81 wherein the variant human hepatocyte growth factor (HGF) comprises amino acid residue replacements R73E and R76E; R73E, R76E and R93E; or R73E, R76E and R78E, numbered in accordance with SEQ ID NO:2.

86. (New) A method according to Claim 80 or 81 wherein the variant human hepatocyte growth factor (HGF) consists of human HGF with amino acid residue replacements R73E and R76E, or amino acid residue replacements R73E, R76E and R93E, numbered in accordance with SEQ ID NO:2.